



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/714,624

11/18/2003

David Stinson

049377.0005/ejg

3237

33797 7590 01/20/2010

MILLER THOMPSON, LLP  
Scotia Plaza  
40 King Street West, Suite 5800  
TORONTO, ON M5H 3S1  
CANADA

EXAMINER

PRICE, CRAIG JAMES

ART UNIT

PAPER NUMBER

3753

MAIL DATE

DELIVERY MODE

01/20/2010

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/714,624	<b>Applicant(s)</b> STINSON, DAVID	
	<b>Examiner</b> Craig Price	<b>Art Unit</b> 3753	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 06 October 2009.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1,3-7,9,18-20 and 28-34 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 28-34 is/are allowed.
- 6) ☒ Claim(s) 1,3,4,6,7 and 9 is/are rejected.
- 7) ☒ Claim(s) 5 and 18-20 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

### **DETAILED ACTION**

Claims 1, 3-7,9,18-20 and 28-34 are pending.

#### ***Claim Objection***

Claims 18-20 are objected to because of the following informalities: Claim 18, line 10, "interval changeable" should be - - interval is changeable - -. Appropriate correction is required.

#### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1, 3, 4 are rejected under 35 U.S.C. 102(e) as being anticipated by DeZorzi (6,518,875).

Regarding claim 1, DeZorzi discloses a digital pressure display (68) comprising, (74) sensor means for intermittently sensing the pressure,

(72) microprocessor means to intermittently enable the operation of the sensor means to sense the pressure at predetermined sampling intervals and generate a signal, and

(70) power means to power the sensor means and the microprocessor means for

Art Unit: 3753

generating a digital pressure reading, wherein the sensor means sensing the pressure at predetermined sampling intervals reduce power requirements (Col. 6, Lns. 25-27).

The claimed limitation: “for a vacuum regulator”, is considered as an intended use limitation. A recitation of the intended use of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim.

Regarding claim 3, DeZorzi discloses that the power means comprises a battery (Col. 3, Lns. 43-45).

Regarding claim 4, DeZorzi discloses that the battery is rechargeable (Col.3, Lns. 43-45), since the battery is a “vehicle” battery it is capable of being recharged.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over DeZorzi '875 in view Salmond (5,032,287).

DeZorzi has disclosed all of the features of the claimed invention except that the digital pressure display further includes a light sensor for sensing a dark condition so as to terminate the generation of the digital pressure reading during the dark condition.

Salmond discloses a fluid system, which utilizes an ambient sensor, which further includes a light sensor for sensing a dark condition (Col. 3, Lns. 28-34) so as to terminate the generation of the digital pressure reading during the dark condition (the term “so as to”, is considered as an intended state of use).

In view of the Salmond patent, it would have been obvious to one of ordinary skill in the art at the time of invention to utilize a light sensor as taught by Salmond into the device of DeZorzi to have a light sensor for sensing a dark condition in order to optimize power consumption.

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over DeZorzi '875 in view Salmond (5,032,287) and further in view of Rabizadeh (5,606,123).

DeZorzi has disclosed all of the features of the claimed invention except that the circuitry has a solar power cell to recharge the battery.

Rabizadeh discloses a pressure monitoring device which teaches that the circuitry has a solar power cell to recharge the battery (Col.6, Lns. 2-3).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to employ a solar power cell as taught by Rabizadeh in order to utilize reusable resources as a power supply.

Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Saito et al. (6,171,104) in view of DeZorzi '875.

Firstly, Saito et al. discloses a manual valve 36 and pressure sensor 35, but is silent to having a microprocessor means to intermittently enable the operation of the sensor means to sense the pressure at predetermined sampling intervals.

DeZorzi discloses a pressure monitoring system for a fluid handling device which teaches the use of a microprocessor (72) means to intermittently enable the operation of the sensor means to sense the pressure at predetermined sampling intervals (Col. 6, Lns. 8-35).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to substitute the microprocessor as taught by Zorzi with the microprocessor of Saito et al. in order to reduce the overlap and interference of data messages from other sensor modules (Col. 6, Lns. 33-35).

Secondly, Saito et al. is silent in providing a visible digital pressure display.

DeZorzi discloses a pressure monitoring device which teaches the use of a visual digital display 68.

It would have been obvious to one of ordinary skill in the art at the time of invention to employ a digital display as taught by DeZorzi into the system of Saito et al. in order to manually indicate to an operator the pressure of the system.

Thirdly, Saito is silent in that the digital display is replaceable with a needle dial display.

Official Notice is hereby taken that it is widely known and notoriously old in the pressure measuring art to use a needle dial display in situations where digital displays are not required, to reduce the use of power.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to utilize a needle dial in place of a digital dial display in order to not require the use of alternative or additional powering means.

***Allowable Subject Matter***

Claim 5 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claims 28-34 are allowed. Claims 18 - 20 are allowed pending correction of the above claim objection.

***Response to Arguments***

In regards for possible future arguments concerning the amendment to claim 1, the amended intended use limitation does not provide a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim.

***Conclusion***

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Craig Price whose telephone number is (571) 272-2712. The examiner can normally be reached on 8AM - 4:30PM Mon-Fri, Increased flex time.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robin Evans can be reached on (571) 272-4777. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/C. P./  
Examiner, Art Unit 3753

14 January 2010

/John Rivell/  
Primary Examiner, Art Unit 3753